

Ness-Net IP-CCTV



104-321 1ch Mini Server
104-322 1ch Advance Server
104-324 1ch Advance Wi-Fi IP Server



104-322



104-321



104-324

User's Manual

About this document

This user manual is intended for administrator and/or user of Video Server products. Operational instructions & network configuration are elaborated. Prior knowledge about network setup and configuration will be helpful.

IMPORTANT

- ✓ Check **PC specification requirements**.
- ✓ Check **OS platform requirements**.
- ✓ Install **NVR** software before you start working with video server.
- ✓ Read special notes and important configuration information.

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1. PRODUCT OVERVIEW

Video server is stand-alone video/audio streaming servers designed for professional IP surveillance applications. With embedded web viewer, streaming video/audio over network can be accessed like browsing a website.

The video server products are all equipped with the proprietary Config service port, making it the only digital surveillance product in the market with proprietary design for "**Ease-of-use**", "**Reliability**", and "**Manageability**".

PACKAGE & CONTENTS

Cost-effective
video server



Full-featured
video server



Full-featured
video server with
wireless

- Video server unit X 1
- Power adapter X 1
- USB cable X 1
- Terminal block connector X 1
- Wall mount Frame + screws (Full-featured w/o wireless model only)
- Antenna (Wireless model only)
- Product CD X 1

2. SOFTWARE CD

Software CD in the package contains the following:

- ✓ Free bundle 16CH NVR IP surveillance management software
- ✓ User Manuals

3. BEFORE YOU INSTALL SOFTWARE

- ✓ PC running Microsoft Windows 2000 or above is only capable of running NVR software.
- ✓ PLEASE go through NVR users' manual before installation to check further PC requirements in order to ensure smooth software operation.

4. LANGUAGE SUPPORT

ENGLISH

NOTE

NVR setup will auto-run when inserting CD. Pay attention to dialog box questions before you press **OK** button.

5. HOUSING and CONNECTORS

Cost-effective video server

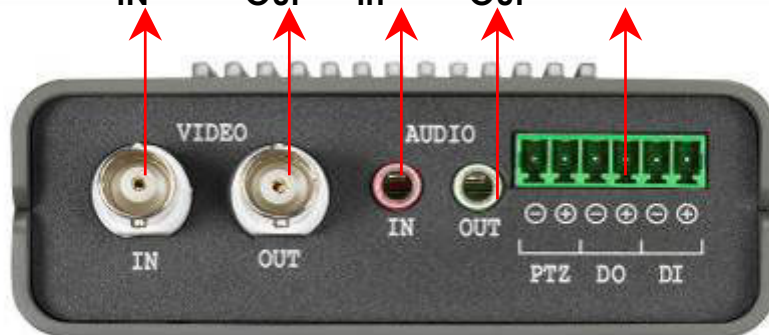


Full-featured video server

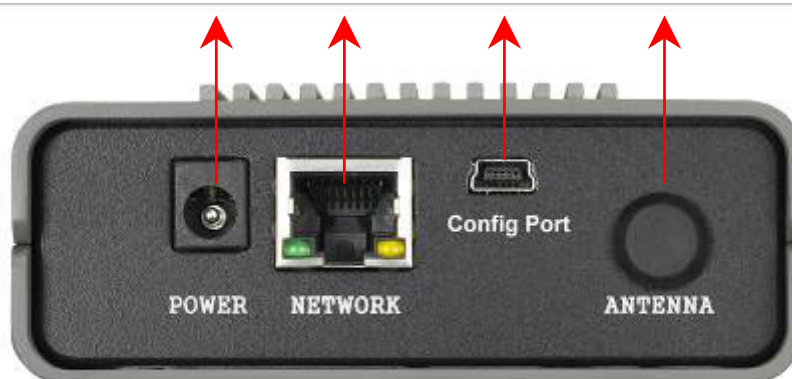


LED
indicators

Video IN Video Out Audio In Audio Out RS-485 (PTZ), DO/DI



Power socket RJ-45 socket Config port WLAN Antenna



6. FIRST TIME USE INSTRUCTIONS *(read carefully)*

INSTALL NVR

Install **NVR** software.

WHICH BROWSER TO USE?

We strongly recommend Microsoft IE browser version 6 or higher.
Mozilla Firefox and similar others are not guaranteed to work with all video servers.

POWER ON VIDEO SERVER

Power on video server by using power adapter provided in the product package. Connect power adapter to 110-220v AC socket.

CONNECTING TO NETWORK

Connect a standard CAT5 ethernet cable to R45 socket on video servers and connect other end to your network hub/switch. Make sure the PC you want to access video servers is on the same network domain.

FACTORY SETTING - INITIAL IP ADDRESS

IP Address: 192.168.1.2
Gateway: 192.168.1.1

NETWORK DOMAIN

Change the IP of the PC you want to access video servers inline with 192.168.1.2.

7. ACCESS VIDEO SERVER

BROWSER

- Open IE browser
- Type IP address of video server that can be pre-define via config

port. **default IP is 192.168.1.2**

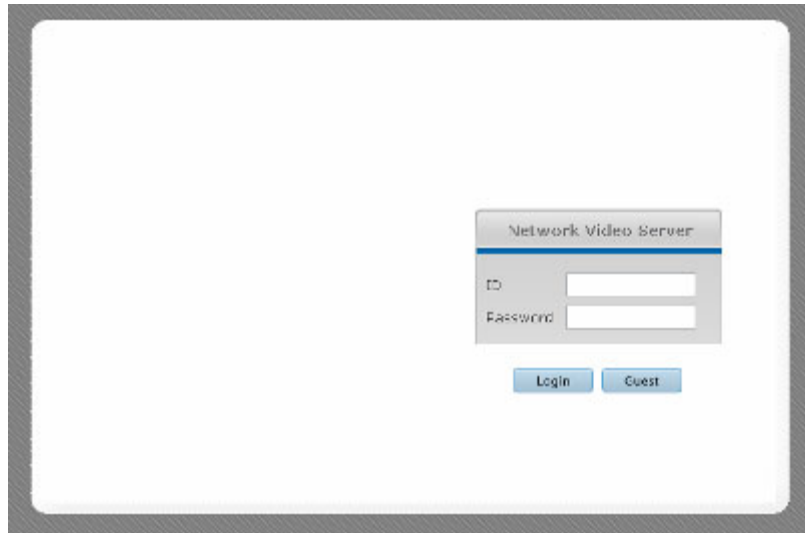
- Initial username and password are...

Login: **root**

Password: **pass**

Click **Login** button to go to web view.

After successful login with root/pass, you will briefly see a screen as below.



INITIAL USERNAME & PASSWORD

Administrator

- Default ID/Password = **root/pass**.
- Only password is changeable.
- Full access right to view, control system settings.

Guest accounts

- ID/Password not necessary.
- Basic view and some action buttons can work.

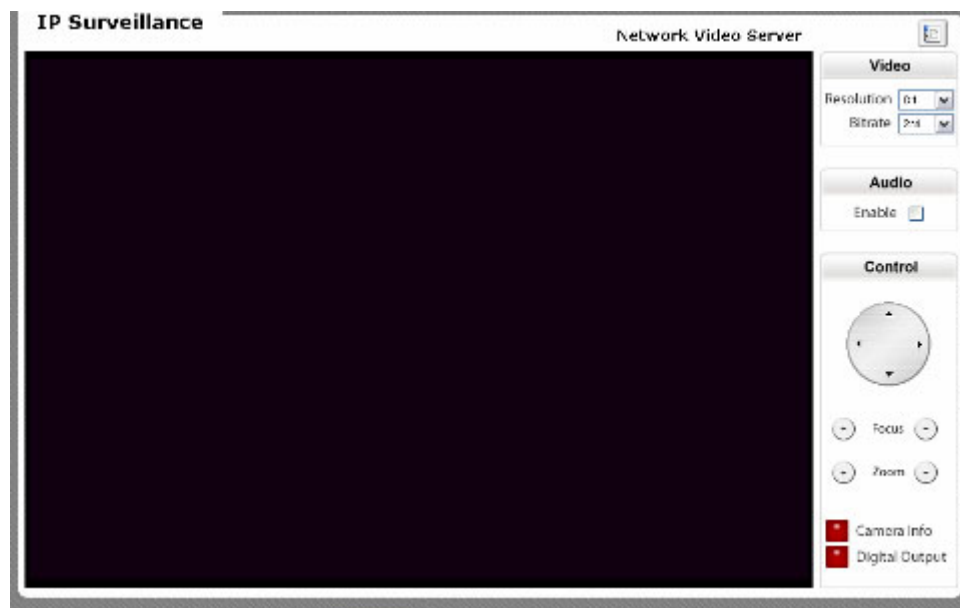
VIEWING PAGE

After successful log in as **Guest**, the viewing page will appear as follows. The "**camera info**" button when clicked shows FPS, camera name and resolution values. This applies to both video servers

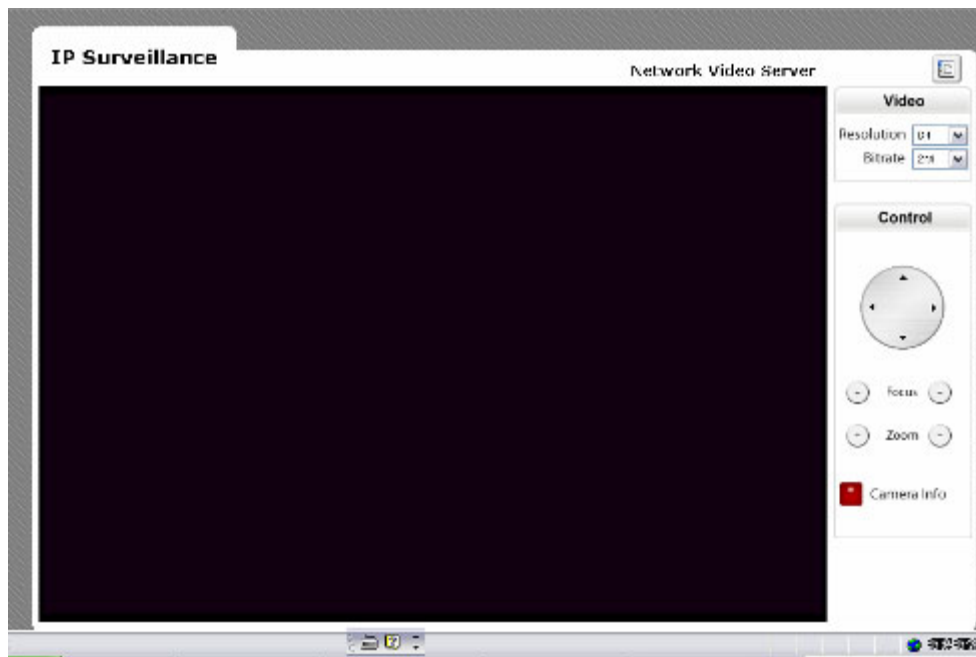


When you log in successfully with ROOT/PASS as **administrator**, the viewer screen will display as shown below.

Full-featured w/o wireless model video server



Cost-effective video server



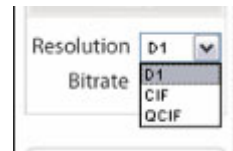
1. Notice top right corner of viewing page has a toggle button to take you between web configuration page & viewing page. Always click that if you want to move from one page to the other.
2. Several controls options are available on the right side.
3. OSD is displayed on top left corner of the screen (time, date, camera name)

CONTROL PANEL SETTINGS

➤ Video/Resolution

Following table describes resolution values for each video format

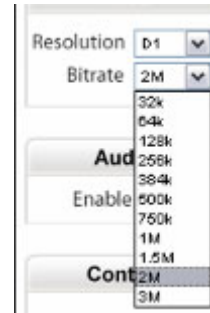
Resolution	CIF	QCIF	D1
NTSC	352X240	704X480	720X480
PAL	352X288	704X576	720X576



➤ Video \ Bit rates

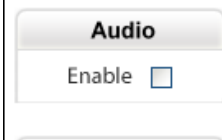
Choose a particular value and it is applied within few seconds. Video on the screen will pause briefly.

32K/64K/128K/256K/384K/500K/750K/1M/1.5M/2M/3M (bps)



➤ Audio \ Enable check box (Full-featured w/o Wireless model ONLY)

Enable or disable function for audio will result in video flicker for a second and then return back to normal. This is not an error.

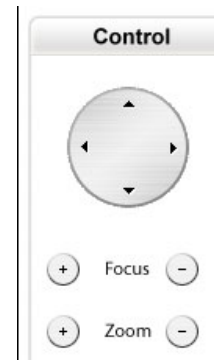


➤ P/T/Z controls (will need PTZ controller)

Z (Zoom): zoom in (+) / zoom out (-).

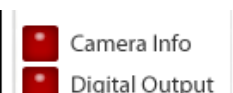
Pan/Tilt.

F (Focus): focus in (+) / focus out (-).

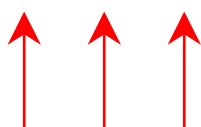


➤ Camera Information.

Shows video information of the transferred data on the upper left corner of the video screen such as frame rate (fps), channel name, resolution.



FPS Name Resolution





➤ Digital Output (Full-featured w/o Wireless model ONLY)

- ✓ When enabled, DO provide contact close and acts purely as a switch.



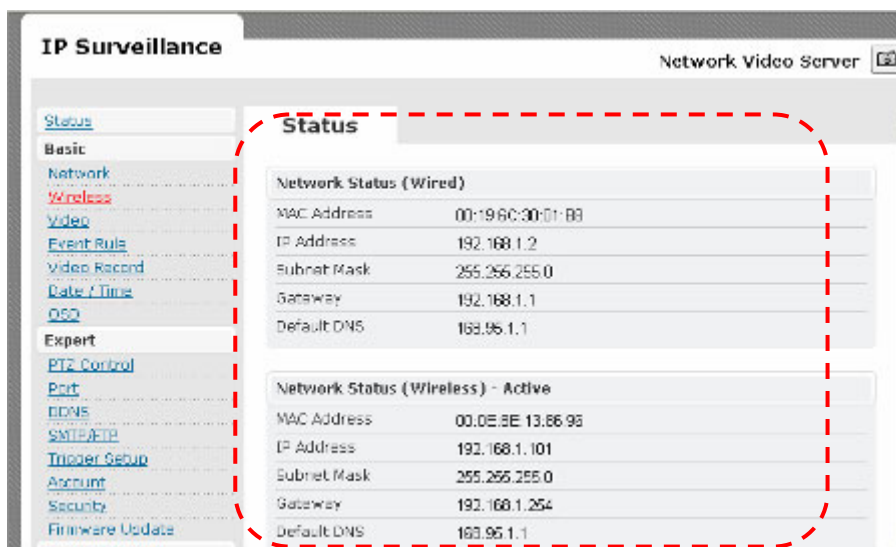
8. WEB INTERFACE SETTINGS

Video Servers built-in web interface offers more advanced settings.

On the main viewing page, click on (top-right)



, to enter server settings page. It is a toggle button to switch between Config and view pages.

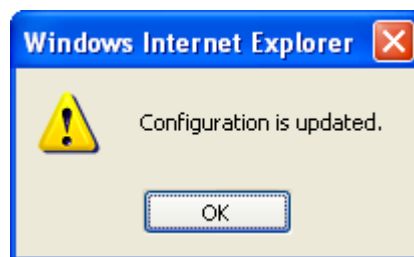


STATUS

- Initial view of web Config interface is status page.
- Hardware & Firmware information along with network status such as current IP and related details are clearly shown.

NOTE

Remember to press "**OK**" after you have changed settings in a particular settings page which has "**OK**" button. After few seconds, you can see a confirmation dialog box informing that settings have been updated. Pressing **OK** will return to the same page.



NETWORK

Three configuration types are available for wired network connection
STATIC, DYNAMIC & PPPoE.

STATIC IP

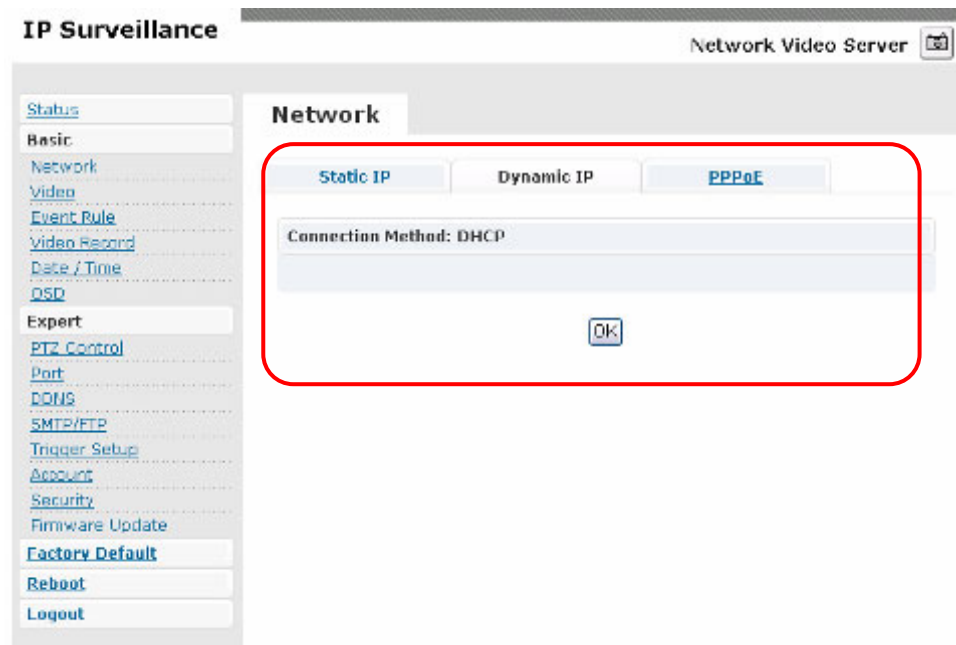
The screenshot shows the 'IP Surveillance' web interface. On the left is a sidebar menu with links: Status, Basic, Network, Video, Event Rule, Video Record, Date / Time, OSD, Expert, PTZ Control, Port, DDNS, SMTP/FTP, Trigger Setup, Account, Security, Firmware Update, Factory Default, Reboot, and Logout. The 'Network' section is active, showing three tabs: Static IP, Dynamic IP, and PPPoE. The 'Static IP' tab is selected, and the 'Connection Method: Static IP' section is highlighted with a red dashed border. This section contains four input fields: IP Address (192.168.1.2), Subnet Mask (255.255.255.0), Gateway (192.168.1.1), and Default DNS (188.95.1.1). An 'OK' button is located below these fields.

Connection Method: Static IP	
IP Address	192.168.1.2
Subnet Mask	255.255.255.0
Gateway	192.168.1.1
Default DNS	188.95.1.1

OK

- IP Address
 - Confirm with network administrator.
- Subnet Mask/Gateway/Default DNS
 - Confirm with network administrator.
- Always click "**OK**" to save changes in a particular page.
- Reboot is required and will be automatically triggered after you press "**OK**". Wait for count down timer to finish and page will refresh automatically and you should see initial login page.

DYNAMIC IP



- If DHCP server is on LAN and you want to allocate Dynamic IP address, use DHCP.
- Click "**OK**" button.
- Reboot is required and will be automatically triggered after you press "**OK**". Wait for count down timer to finish and page will refresh automatically and you should see initial login page.

PPPoE SETTINGS

The screenshot shows the 'IP Surveillance' web interface for a 'Network Video Server'. The 'Network' tab is selected, and the 'PPPoE' sub-tab is active. The 'Connection Method' is set to 'xDSL'. The 'User ID' is 'pppoe_user'. The 'User Password' is masked with dots. The 'Verify Password' field also has dots, but a red error message 'Password is not matched' is displayed next to it. The 'MTU' is set to 1412. The 'DNS Server' is set to 'Auto'. The 'DNS' field contains the IP address '188.95.1.1'. An 'OK' button is at the bottom right of the form.

Network		
Static IP	Dynamic IP	PPPoE
Connection Method: xDSL		
User ID	pppoe_user	
User Password	•••••	
Verify Password	•••••	Password is not matched
MTU	1412	
DNS Server	☐ Manual ☒ Auto	
DNS	188.95.1.1	
OK		

- PPPoE is used in case network supports PPPoE like xDSL
- Request Internet Service Provider for PPPoE ID/Password
- User ID / Password
 - PPPoE user ID / Password
- Service Name
 - Service name of ISP
- MTU
 - Maximum transmission unit of data
- IP address of DNS sever can be set to be created automatically.
- If xDSL does not use static IP, you should use DHCP.

Wireless (**ONLY** Wireless model)

IP Surveillance Network Video Server

Wireless

Enable ☒

MAC Address 00:0E:0E:13:05:00

Mode Station

PHY Configuration Profile 802.11b+g Mixed

Station Setting

default Search

SSID Chem-3Com
CHEM-DEMO-NKSP
default
ChemVWireless
ICE

BSS Type Infrastructure

WEP Encryption None

Authentication Type Shared Key

WEP Key (ASCII, no HEX)

Wireless SETTINGS

- Enable
 - Click this check box to enable/disable wireless function
- MAC Address
 - MAC Address of wireless NIC is displayed here
- Mode
 - Wireless video server only supports "Station mode" now
- PHY Configuration Profile

PHY Configuration Profile 802.11b+g Mixed

Station Setting

802.11b+g Mixed
802.11g Only
802.11b Only

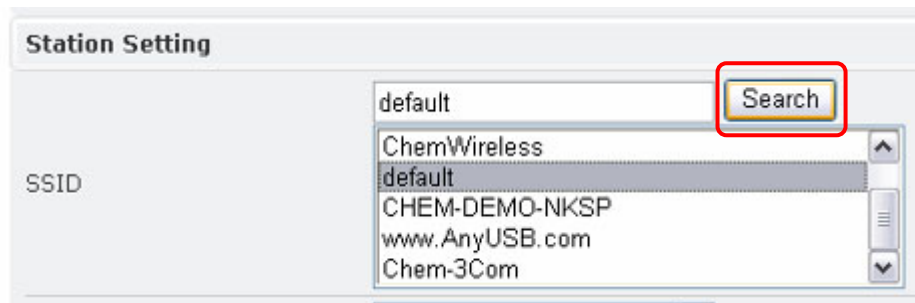
- Wireless video server support "802.11b only" □ "802.11g only"

and "802.11B+g only" three profile. Select correct item based on your Wi-Fi network type; if you are not sure, suggest to select "802.11B+g only" or contact your administrator

Station SETTINGS

➤ SSID

- Click "Search" bottom, after 8~12 sec, system will search available access point signals and list on the box below



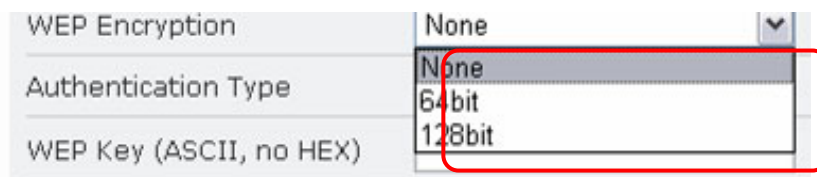
- Select the SSID of access point you want to link

➤ BSS Type



- Wireless video server supports BSS type "Infrastructure" & "Ad-hoc" mode; you can base on your wireless network environment to select specific item

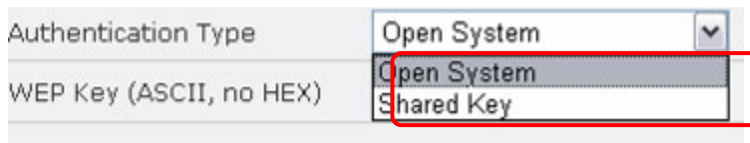
➤ WEP Encryption



- If your access point need Wi-Fi WEP encryption for wireless association, select 64bit or 128bit encryption. Otherwise,

select none

➤ Authentication Type

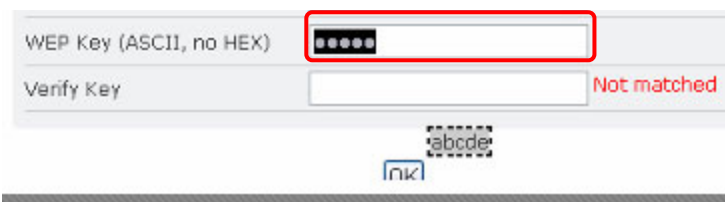


Authentication Type Open System ▼
Open System
Shared Key

- When selecting WEP encryption as 64bit or 128bit, please assign Wi-Fi authentication type as "Open System" or "Shared Key"

**If you are not sure your Wi-Fi network encryption type in detail, please contact with your network administrator

➤ WEP Key



WEP Key (ASCII, no HEX)
Verify Key Not matched

- Input WEP key

Wireless video server WEP Key **only support ASCII input, no HEX

**When you input ASCII, you can find a dynamic text block below; you can use this to check whether or not your input is correct

➤ Verify Key



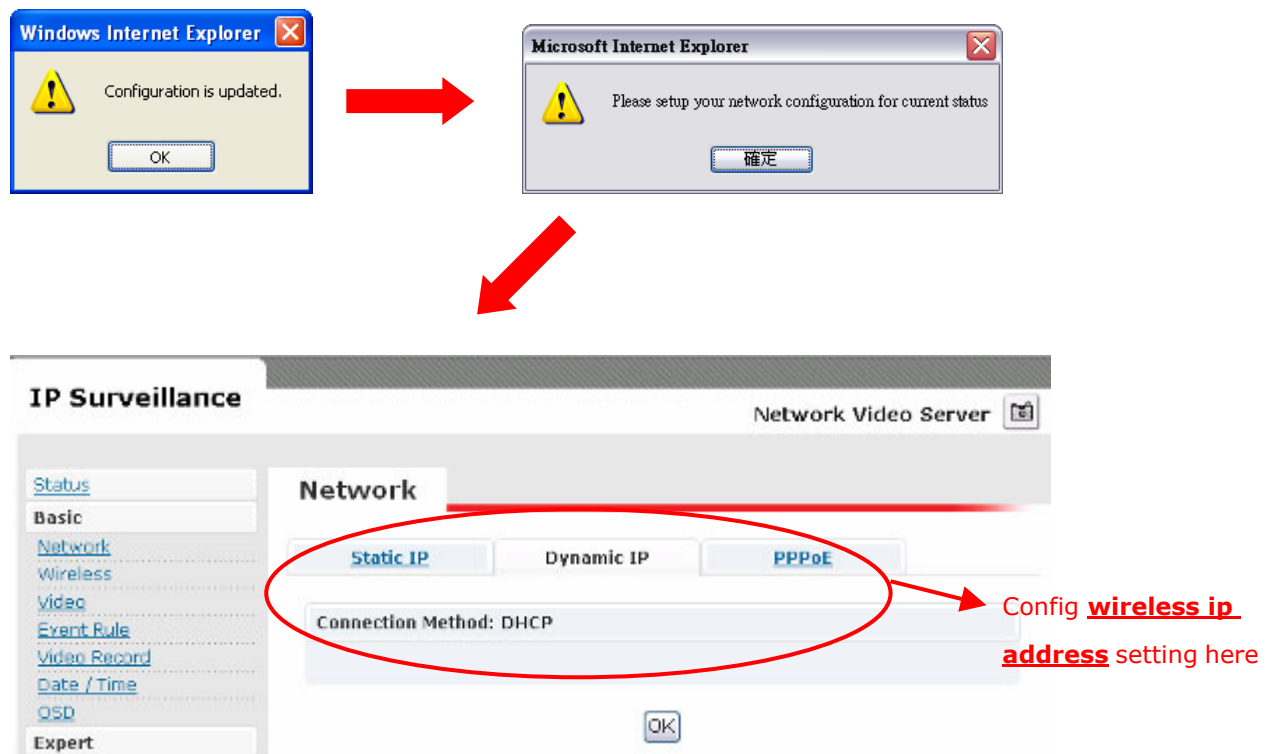
Verify Key Matched

- Input WEP Key again, and make sure system response "Matched" for correct WEP Key double input

NOTE

Remember to press "OK" after you have changed wireless settings. System will

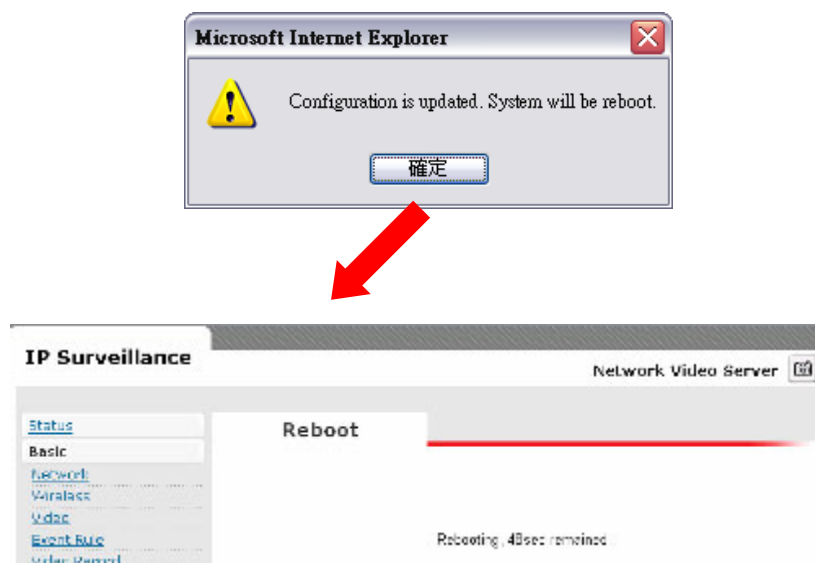
guide you to go to setup WLAN IP address as following



Select correct **wireless** IP address setting based on your AP router define; then click OK.



After setting, system will drive you to reboot process as following



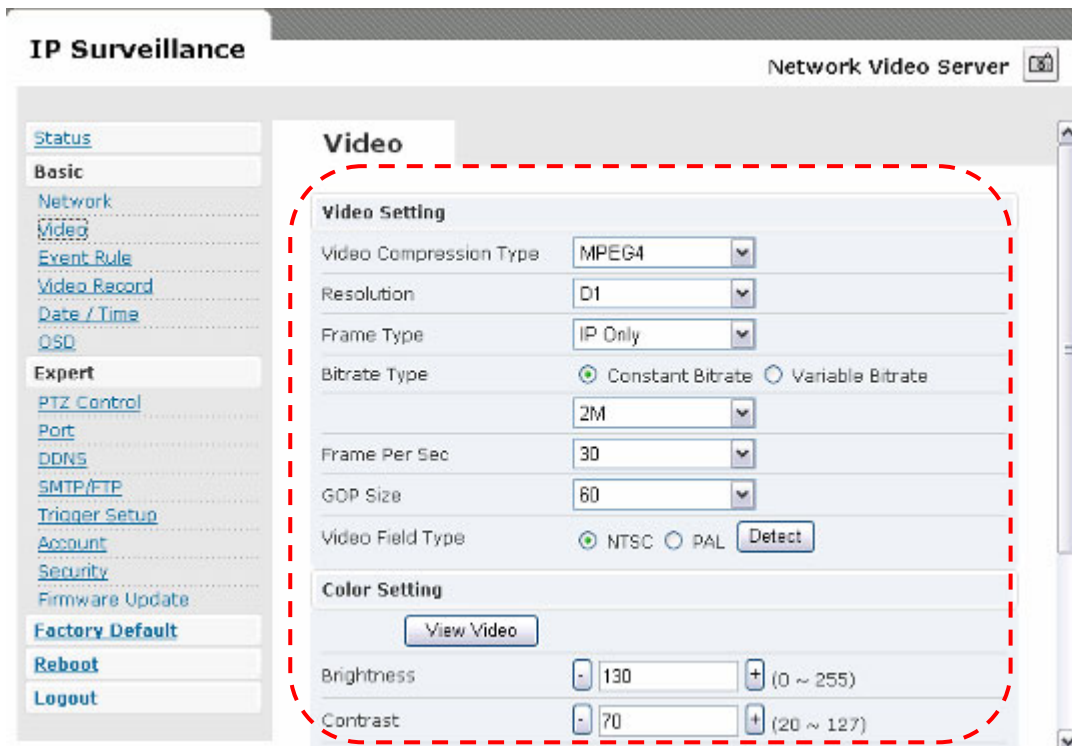
NOTE

When WLAN successfully enabled and get ip address from AP router, wireless video server system will automatically change wired ip address as "**169.254.100.1**"

Status	
Basic	Status
Network	Network Status (Wired)
Wireless	MAC Address 00:19:6C:30:02:70
Video	IP Address 169.254.100.1
Event Rule	Subnet Mask 255.255.255.0
Video Record	Gateway 169.254.100.254
Date / Time	Default DNS 168.95.1.1
OSD	
Expert	Network Status (Wireless) - Active
PTZ Control	MAC Address 00:0E:0E:13:06:00
Port	IP Address 192.168.2.5
DDNS	Subnet Mask 255.255.255.0
SMT/FTP	Gateway 192.168.2.254
Trigger Setup	Default DNS 168.95.1.1
Account	
Security	
Firmware Update	

The "**Network**" setting page refers to WLAN setting when WLAN is enabled; otherwise, it refers to wired setting when WLAN is disabled.

VIDEO



VIDEO SETTINGS

➤ Video Compression Type

- MJPEG / MPEG4

➤ Resolution

- CIF / QCIF / D1

➤ Frame Types

This setting deals with the Group of Pictures (GOP) structure - which could be a combination of I and P frames.

I - I frames - also referred to as Key frames contain information for a complete picture, and can be decoded independent of any other frame. I frames are the largest (and least compressed) frames. Therefore for same quality, they consume high bit rate.

P - P frames are encoded using information from the previous I or P frame, and can only be decoded correctly if the previous I / P frame is available. P frames are smaller than I frames.

- I Only / IP Only

- IP - Simple Profile - Medium bit rates for same quality.

- I - Highest bit rates for same quality.

**When choosing MJPEG streaming, ONLY support "I Only" mode

➤ Bit rate Type

- Constant and Variable bit rates control allows flexibility in choosing how much bandwidth is available on network and quality of video required.

➤ Constant Bit rates

- 3M / 2M / 1.5M / 1M / 750K / 500K / 384K / 256K / 128K / 64K / 32K

➤ Variable Bit rates

- 2 ~ 31 (quality is best in case value is "3")

➤ Frame per Second.

- 1 ~ 30

➤ Group Size

- Adjusts the ration between "I" frames and "P" frames. Lower the group size, better the quality.

- 5 / 10/ 15 / 30 / 60

➤ Video Type

- NTSC / PAL

**System can automatically detect input video signal when clicking detect icon

COLOR SETTINGS

Fine adjustments to video quality can be made using more detailed settings as shown below.

Brightness	- 130 +	(0 ~ 255)
Contrast	- 70 +	(20 ~ 127)
Saturation	- 90 +	(0 ~ 127)
Hue	- 0 +	(0 ~ 255)

BRIGHTNESS

Adjusts the image on a scale from darkness to brightness.

CONTRAST

Adjusts the extent to which adjacent areas on a video differ in brightness

SATURATION

Adjusts the chromatic purity of video thereby effecting vividness.

HUE

Adjusts the video by effecting color depth

VIDEO PREVIEW

Preview makes choices easier when tuning video settings for specific locations. By clicking the **View Video** button, you can see the following

Color Setting

Stop

Test

Reset

☐ Enable Preview

Click **Stop** to exit preview. You could change other video parameters and press **TEST** to see how the changes look like. You can press **Reset** anytime to return back to the default settings. Click **Enable Preview** checkbox to save the current settings – and its takes effect right after settings have been changed.

MAX CLIENT LIMIT

Maximum users (client) limit allows users accessing the video stream. For higher bit rates and resolution, the client limit is much lower and vice versa.

- Maximum number of clients can be restricted depending on how much video quality is required and network band with is available.
 - 0 ~ 10 (value 0 means maximum allowable)

DO NOT FORGET TO PRESS “OK” BUTTON TO SAVE YOUR SETTINGS.

EVENT RULE

Basically, Full-featured models capable of handling all standard events. Cost-effective model having limited input sockets (only PTZ), only handles motion detection and periodic timer.

Events handled by Cost-effective Model

1. Motion Detection
2. Periodic Timer

Actions supported by Cost-effective model

1. PTZ Preset
2. E-mail Notification

	Digital Output	PTZ Preset	E-mail notification
Digital input			
Motion Detection		X	X
Periodic Timer		X	X

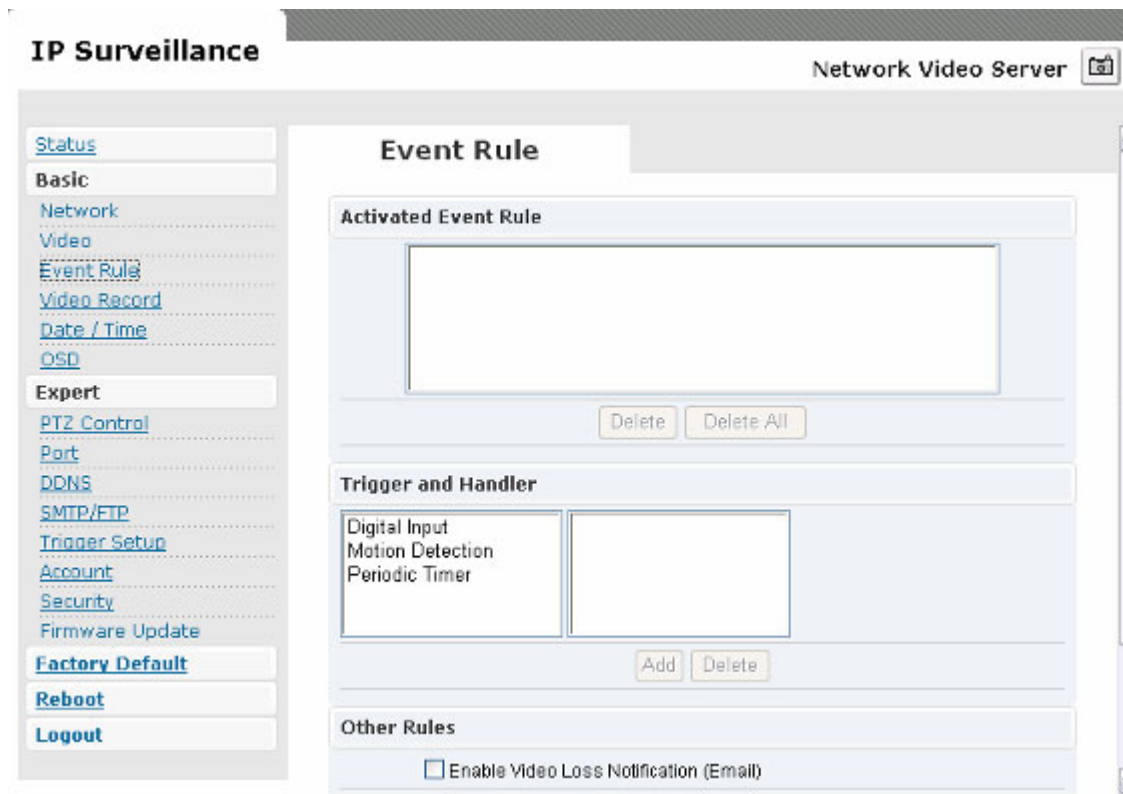
Events handled by Full-featured Model

1. Digital IN
2. Motion Detection
3. Periodic Timer

Actions supported by Full-featured Model

1. Digital Output
2. PTZ Preset
3. E-mail Notification

	Digital Output	PTZ Preset	E-mail notification
Digital input	X	X	X
Motion Detection	X	X	X
Periodic Timer	X	X	X



EVENTS HANDLED

Motion Detection

If motion is detected on the areas defined on the video stream, an event will be triggered based on the rule lists.

Periodic Timer

In a pre-defined time interval, an event will be triggered based on the rule lists.

ACTIONS TRIGGERED

PTZ Preset

PTZ set to a particular preset value can be triggered based on occurrence of an event listed out in "***Rule Lists***".

E-mail Notification

E-mail can be sent based on occurrence of an event listed out in "**Rule Lists**".

RULE LISTS - ADDING/DELETING

Select an event and select corresponding action. Click **add** button and notice that is added in the **Rule lists** Information box.

MODIFYING RULE LISTS

Rule list items can be deleted individually or wholly by clicking **Delete All** button.

VIDEO RECORD

Choose **Enable** checkbox to record video/snapshot during a Motion detection or Digital IN event.

Choose between two kinds of events – Motion detection / Digital IN

Default option of output is FTP upload

Video file size - max... 15 seconds duration

File name prefix – user defined

You can also define the folder name (path).

IP Surveillance

Network Video Server

Status

Basic

Network

Video

Event Rule

Video Record

Date / Time

QSD

Expert

PTZ Control

Port

DDNS

SMTP/FTP

Trigger Setup

Account

Security

Firmware Update

Factory Default

Reboot

Logout

Video Record

Video Record

Enable

☒

Trigger By

Event

Motion Detection

Output Type

FTP Upload

Show Settings

Record Duration(1 pic/s)

5

secs (max. value is 15)

[Settings for FTP Upload]

Filename Prefix

CAMERA

Save Path

IPS_REC

(one layer o

Change Settings

OK

Scheduled recording can also be done by defining the time and day.

Video Record

Enable

☒

Trigger By

Event

Motion Detection

Output Type

FTP Upload

Show Settings

Record Duration(1 pic/s)

5

secs (max. value is 15)

[Settings for FTP Upload]

Filename Prefix

CAMERA

Save Path

IPS_REC

(one layer o

Change Settings

DATE & TIME

IP Surveillance

Network Video Server

Status

Basic

Network

Video

Event Rule

Video Record

Date / Time

OSD

Expert

PTZ Control

Port

DDNS

SMTP/FTP

Trigger Setup

Account

Security

Firmware Update

Factory Default

Reboot

Logout

Date / Time

Server Time 2000-01-29 09:57:44

Time Zone (GMT +08:00) Taipei

☒ Client PC Time 2007 - 9 - 10 20 : 6 : 46

☐ Time Server time.windows.com

OK

- Date and time settings can be synchronized with PC directly by clicking "Client PC time" check box. Click "**OK**" after you have made selection.

☒ Client PC Time 2007 - 9 - 3 19 : 15 : 48

- Time zone can be chosen by choosing either of the two time servers listed
- Either of the two time servers can be chosen to synchronize video server time. They are listed as follows should you choose **Time Server**. Click "**OK**" after you have changed settings.

☐ Time Server time.windows.com

pool.ntp.org

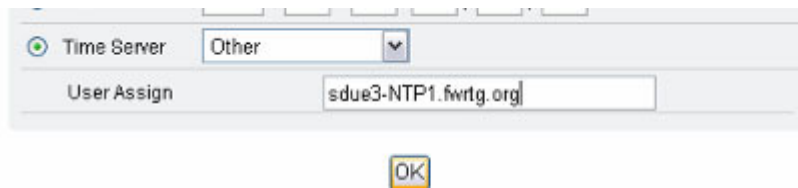
time.windows.com

Other

OK

- If you want to manually input time server, choose "**Other**" then you can find a manual input edit box appear. Key in your preferred time

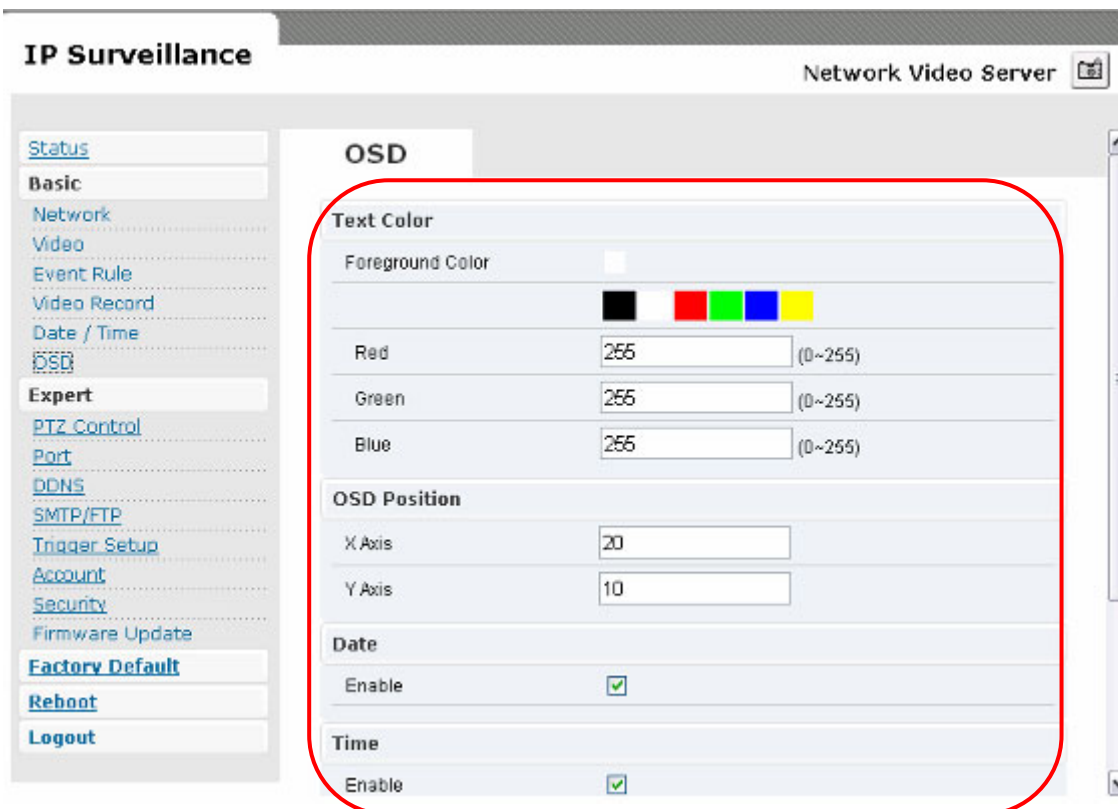
server and click "**OK**".



A screenshot of a configuration window for a Time Server. It features a dropdown menu labeled 'Time Server' with 'Other' selected. Below it is a text field labeled 'User Assign' containing the value 'sdu3-NTP1.fwrtg.org'. At the bottom center is an 'OK' button.

OSD

Click on your desired choice of color. Values will change accordingly for R, G, and B. If you desire some other color, you can manually define those corresponding R, G, B values in the boxes as appropriate. Position of OSD can be changed by defining the X, Y values. Date & Time can be individually enabled/disable by "Date" & "Time" checkboxes.



A screenshot of the 'IP Surveillance' web interface, specifically the 'OSD' (On-Screen Display) configuration page. The page has a sidebar with navigation links like 'Status', 'Basic', 'Network', 'Video', 'Event Rule', 'Video Record', 'Date / Time', 'OSD', 'Expert', 'PTZ Control', 'Port', 'DDNS', 'SMTP/FTP', 'Trigger Setup', 'Account', 'Security', 'Firmware Update', 'Factory Default', 'Reboot', and 'Logout'. The main content area is titled 'OSD' and contains several sections: 'Text Color' with a 'Foreground Color' selector (showing black, red, green, blue, and yellow) and input fields for Red (255), Green (255), and Blue (255); 'OSD Position' with input fields for X Axis (20) and Y Axis (10); 'Date' with an 'Enable' checkbox checked; and 'Time' with an 'Enable' checkbox checked. A red rounded rectangle highlights the 'Text Color', 'OSD Position', 'Date', and 'Time' sections.

Channel name can be shown/hidden by the channel name "**Enable**" checkbox. It can be manually typed in the "**Channel name**" text box and changes can be noticed.

OSD Position

X Axis: 20

Y Axis: 10

Date

Enable: ☒

Time

Enable: ☒

Channel Name

Enable: ☒

Channel Name: CAMERA

OK

PTZ CONTROL

IP Surveillance Network Video Server

PTZ Control

Channel 1

Channel Model (PTZ Model): none

Channel ID (Rx Address): 0

Baud Rate: B9600

Data Bits: 8

Parity: none

Stop Bits: 1

OK

- Channel Mode (PTZ model)
 - Default is none.
 - PelcoP/PelcoD/Merit-Lilin/Transparent can be chosen.
- Channel ID
 - Give address value - default is zero.

- Baud rate / Data bits / Parity / Stop bits
 - Depending on the protocol used, the values of baud and related settings are to be assigned accordingly.

PORT

The values of WEB and AV port can be changed as necessary.

The screenshot shows the 'IP Surveillance' web interface. On the left is a navigation menu with categories: 'Basic' (containing Status, Network, Video, Event Rule, Video Record, Date / Time, OSD) and 'Expert' (containing PTZ Control, Port, DDNS, SMTP/FTP, Trigger Setup, Account, Security, Firmware Update, Factory Default, Reboot, Logout). The 'Port' option under the 'Expert' category is highlighted in red. The main content area is titled 'Port' and contains two sections: 'Web' with a 'Web Port' input field set to '80', and 'Video + Audio' with an 'AV Port' input field set to '1852'. An 'OK' button is located at the bottom of the configuration area.

Web

- Web Port default is 80

Video + Audio

- Default is 1852 for video/audio data transmission.

DDNS

The screenshot shows the 'IP Surveillance' web interface for a 'Network Video Server'. On the left is a sidebar menu with options: Status, Basic, Network, Video, Event Rule, Video Record, Date / Time, OSD, Expert, PTZ Control, Port, DDNS, SMTP/FTP, Trigger Setup, Account, Security, Firmware Update, Factory Default, Reboot, and Logout. The main content area is titled 'DDNS' and contains the 'IPv4 DDNS' configuration section. This section is highlighted with a red rectangle. It includes an 'Enable' checkbox which is checked, a 'Which Service' section with radio buttons for 'ddns.nu' and 'dyndns.org' (the latter is selected), and a sub-section for 'dyndns.org' with input fields for 'Hostname' (containing 'ddnsuser'), 'DDNS ID' (containing 'ddnsuser'), and 'DDNS Password' (empty). An 'OK' button is located at the bottom right of the configuration area.

DDNS is the function that maps an IP address to a host name. If video servers are set to dynamic IP address, the host name by DDNS (Dynamic Domain Name Service) must be used instead of the IP address for credibility of network connection.

IPv4 DDNS

- Check "**Enable**" and select a service out of available two.
- Both services are required to register some items on each DDNS service site.
- For use of "**ddns.nu**" register at www.ddns.nu and for **dyndns** find the information at dyndns.org

SMTP/FTP

IP Surveillance Network Video Server

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Expert
[PTZ Control](#)
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[DDNS](#)
SMTP/FTP
[Trigger Setup](#)
[Account](#)
[Security](#)
[Firmware Update](#)
[Factory Default](#)
[Reboot](#)
[Logout](#)

SMTP/FTP

Remote SMTP Setup

SMTP Server	smtp.mail.com
SMTP Port	25
Authentication	☒
Auth User	smtp
Auth Password	••••••••
Sender's Email	user@smtp.mail.com
Recipient's Email	user@smtp.mail.com
Enable Attachment	☒

Remote FTP Setup

FTP Server	192.168.1.1
FTP Port	21
Auth User	ftpuser

An e-mail notification & FTP upload service offered by video servers notifies events or uploads snapshots to a remote FTP server.

E-MAIL – SMTP SETTINGS

Fill in the details of SMTP server such as port number, user name, password, server name information. If you would wish to send attached snapshots, please check the appropriate check box.

Sometimes Authentication is not always required by SMTP servers.

Wherein only the SMTP server name and e-mail address details are enough to be input.

Remote SMTP Setup	
SMTP Server	smtp.mail.com
SMTP Port	25
Authentication	☒
Auth User	smtp
Auth Password	••••••••
Sender's Email	user@smtp.mail.com
Receipient's Email	user@smtp.mail.com
Enable Attachement	☐

FTP SETTINGS

Fill in the details of remote FTP server, port number and user name, password.

Remote FTP Setup	
FTP Server	192.168.1.1
FTP Port	21
Auth User	ftpuser
Login Password	••••••••

TRIGGER SETUP

IP Surveillance

Network Video Server

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Trigger Setup

Digital Input
Periodic Timer
Motion Detection
Video Loss

Digital Input

Sensor Type
☒ N.O (Normal Open)
☐ N.C (Normal Close)

OK

Three different types of EVENTS can be configured.

Digital INPUT

Can be **Normal OPEN (N.O)** or **Normal Close (N.C)**

Choose based on the type of input and press **OK** to save the settings.

The screenshot shows the 'IP Surveillance' web interface for a 'Network Video Server'. On the left is a sidebar menu with categories: 'Status' (with a link), 'Basic' (with links for Network, Video, Event Rule, Video Record, Date / Time, and OSD), and 'Expert' (with links for PTZ Control and Port). The main area is titled 'Trigger Setup' and contains four tabs: 'Digital Input' (selected), 'Periodic Timer', 'Motion Detection', and 'Video Loss'. Under the 'Digital Input' tab, there is a 'Sensor Type' section with two radio buttons: 'N.O (Normal Open)' (which is selected) and 'N.C (Normal Close)'. An 'OK' button is located at the bottom right of the configuration area.

PERIODIC TIMER

Timer interval can be set in terms of seconds. This will trigger an event when the time out is achieved.

This screenshot shows the same 'IP Surveillance' web interface, but the 'Periodic Timer' tab is now selected under the 'Trigger Setup' section. The 'Digital Input' tab is still visible on the left. The 'Periodic Timer' configuration area shows a 'Time Interval(secs)' field with the value '60' entered. An 'OK' button is positioned at the bottom right of the configuration area.

MOTION DETECTION

➤ Detection Area

- Total viewing screen area is divided into 9 square blocks and each of them is called area 1, area 2 etc., Click specific areas you want motion detection to be enabled. If a detection area is

selected color changes to dark gray.



➤ Sensitivity value

- Defines sensitivity of the motion detection. The range of the value is 1 to 100.

➤ Motion Vector value

- To detect even slightest movement for objects in selected area, please select a lower motion vector value. The range of the value is 3750 to 4650.

➤ SAD value.

- To only detect flashing light or any such significant activities on immovable objects, low SAD value should be chosen. In most cases, high SAD level is recommended. The range of the value is 20 to 150.

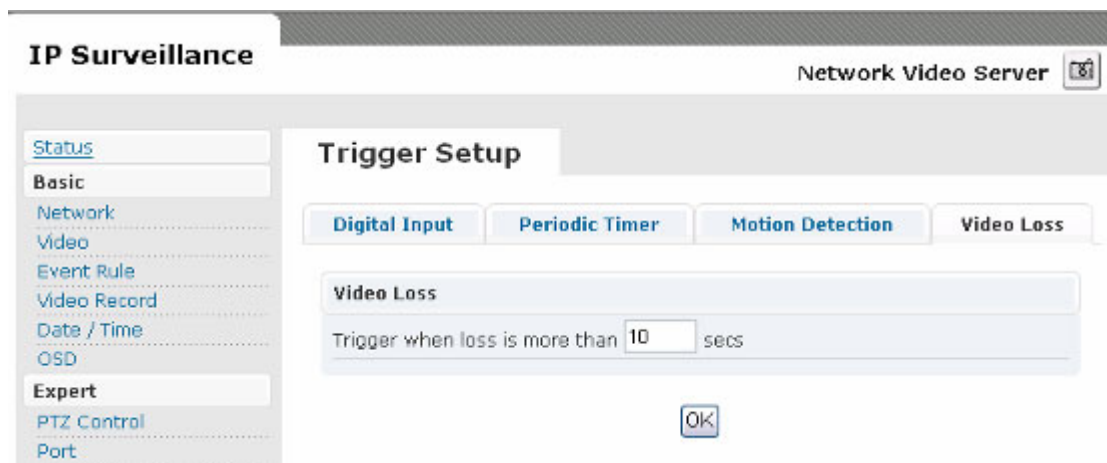
Sensitivity	20	(1 ~ 100)
Motion Vector	4000	(3750 ~ 4650)
SAD	80	(20 ~ 150)

Motion detection enabled areas look as shown below. A simple click can select any of the boxes on detect area.



Video Loss

Can config how much time system should trigger an event for video loss



ACCOUNT

Administrator can create user accounts. Login as an administrator and create user accounts by pressing "**Add**". Each account has PTZ, Video settings and Digital Out privileges. They can be turned on or off anytime by the administrator.

There are limits on user name and password length and will be notified by dialog boxes if the user name/password exceeds or under-runs that limit.

IP Surveillance

Network Video Server

Status

Basic

Network

Video

Event Rule

Video Record

Date / Time

OSD

Expert

PTZ Control

Port

DDNS

SMTP/FTP

Trigger Setup

Account

Security

Firmware Update

Factory Default

Reboot

Logout

Account

User ID	PTZ	V/S	D/O	
root	☒	☒	☒	Password

User ID	Password	Confirm	PTZ	V/S	D/O
			☐	☐	☐

Add

Guest Permission

Enable

☒

OK

For each account, guest permissions can be turned ON/OFF. Any time, an account's settings can be modified by pressing the **"Modify"** button.

Account

User ID	PTZ	V/S	D/O	
root	☒	☒	☒	Password

User ID	Password	Confirm	PTZ	V/S	D/O
			☐	☐	☐

Add

Guest Permission

Enable

☒

OK

Administrator account can also be modified by the same "Password" button. Changing password needs confirmation.

Modify

Modify Password

ID	root
Old Password	••••
New Password	••••
Confirm	•••••

Modify

Account Limitations

- Administrator can add up to a maximum of 5 users and assign properties for each of them.

Guest Permissions

- Guest account can be turned ON/OFF anytime.

SECURITY

The basic settings are **LOW** by default.

IP SurveillanceNetwork Video Server

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Security

Security Level

☐ HIGH	Only connections from the local area
☐ MEDIUM	Video and Audio connections from any place; Setting connections from the local area
☒ LOW	All connections from any place

OK

- HIGH
 - ONLY LAN connections are allowed.
- MEDIUM
 - Video and audio connections from any location and settings from LAN are permitted.
- LOW
 - All connections from any location are permitted.

FIRMWARE UPDATE

IP Surveillance Network Video Server

Firmware Update

Select Language

Language File: English [v] [Update]

Firmware Update

Firmware File: [] [Browse] [Upload]

Language

- Default settings are in English. A choice of Traditional Chinese is available.

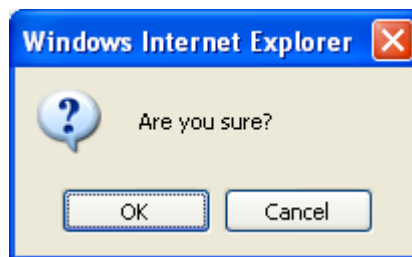
Firmware update

- Firmware update binary file can be obtained from your vendor.

Choose that and click **upload**. When uploading is done, reboot is required and will be automatically triggered.

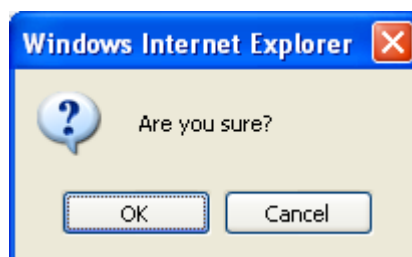
9. FACTORY DEFAULT

After a confirmation dialog box, clicking **OK** button, will load default settings and do a reboot. You will see the reboot countdown timer running. Once done, you will see the login page. Please login with root/pass.



10. REBOOT

If you click **OK** on the dialog box, you will see the reboot countdown timer running. Once done, you will see the login page. Please login with root/pass or other appropriate login information.



11. LOGOUT

To return to the login screen, simply click **logout**. You should see yourself in the login page within seconds.

12. Config Port - FIRST TIME EXPERIENCE

If video server has to be quickly configured or has to be set to factory default settings, Config port is used to achieve that. Config port is a special USB port.



Insert mini USB cable onto Config port and connect other end to PC. When video server is powered on, Config port will not be operational. Once you are done working with Config port, remember to unplug USB cable from Config port.

NOTE

REMOVE Config Port (USB) CABLE WHEN YOU ARE FINISHED WITH QUICK CONFIGURATION.

SUPPORTED OS

PC running the following operating systems can support auto run of **Quick Config** application.

1. Windows XP (all editions) - auto run.
2. Windows 2000 (all editions) – needs to be manually run.
3. Windows 98 (SE) – needs to be manually run

(Generic USB mass storage class driver (Microsoft) will be requested – prepare one in prior if you plan to use Config port based device recovery on Windows 98)

NO SOFTWARE INSTALLATION REQUIRED

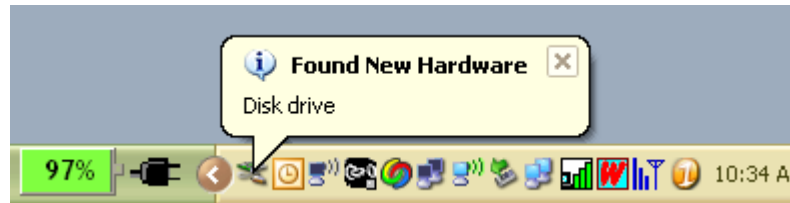
There is no installation or setup of any software for Windows XP/2000 platforms.

STEPS FOR USING Config Port (**Windows XP PC**)

1. Disconnect **power cable** connected to video servers.
2. Use mini-USB cable and connect appropriate end to Config port and connect other end to PC USB port.



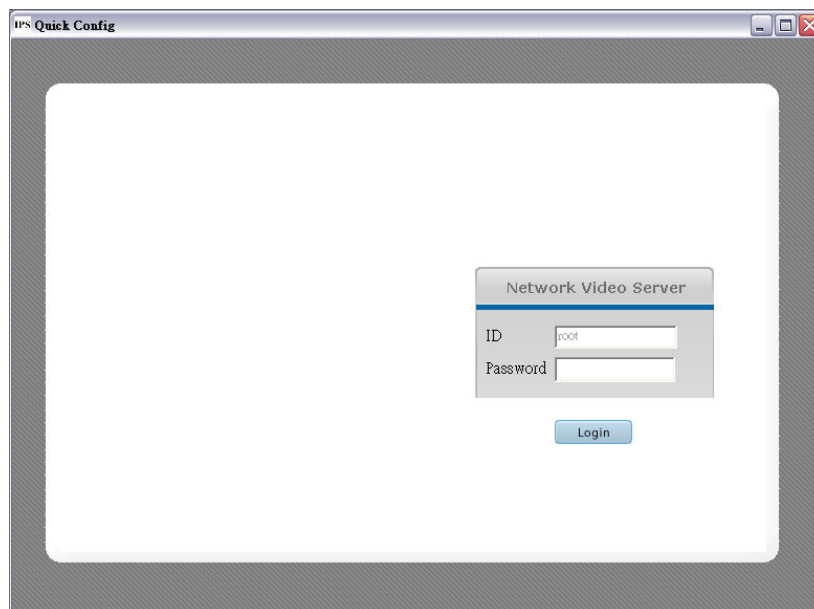
3. After 5 ~ 10 seconds depending on how fast your PC is, you can notice "**Disk drive**" being detected.



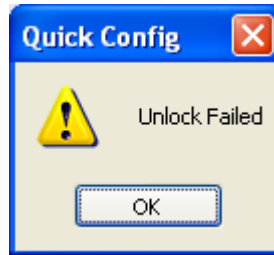
4. A POP-UP dialog shows “**Config Wizard**” is ready to run. Press OK.



5. Double click Config Wizard. You will see a screen as follows.



You will be asked for password. Earlier, if you have never changed the password for user **root**, please type **pass** as the password. Then click **login** button. If you input wrong password, you will get this dialog box.



IPS Quick Config

Network Video Server

IP Surveillance

Status

System Information	
Network Type	Static IP
IP Address	192.168.1.2
Subnet Mask	255.255.255.0
Gateway	192.168.1.1
Default DNS	168.95.1.1

Wireless Information	
Enable	no
Mode	Station
PHY Configuration Profile	802.11b+g Mixed
SSID	(Not Set)
BSS Type	Infrastructure
WEP Encryption	None
Authentication Type	Shared Key

You will see the network status of video server .To navigate through Quick Wizard, click it and you will find a window appear as below.

The screenshot shows a web-based configuration window titled "IP Surveillance" with a sub-header "Network Video Server". Below this is a "Setup Wizard" section with two tabs: "Network" (selected) and "DDNS". The main content area is titled "Step 1 : Wireless Configuration" and contains the following fields:

Enable	☐
Mode	Station
PHY Configuration Profile	802.11b+g Mixed
SSID	
BSS Type	Infrastructure
WEP Encryption	None
Authentication Type	Shared Key
WEP Key (ASCII, no HEX)	

At the bottom of the configuration area are "Back" and "Next" buttons.

If wireless video server model, you will see WLAN configuration page; config WLAN setting in this page and click next to go on

The screenshot shows the same "IP Surveillance" window, but now at "Step 2 : Select Network Connection Type". The "Network" tab is still selected. The configuration area contains three radio button options:

- ☐ Static IP
- ☒ DHCP
- ☐ PPPoE

"Back" and "Next" buttons are located at the bottom of the configuration area.

If you would wish to change network settings of either

STATIC / DHCP / PPPoE

If you would want to setup **DDNS**, please click on the same for detailed configuration.

The screenshot shows the 'DDNS Setup' configuration page. At the top, there are two tabs: 'Network' and 'DDNS', with 'DDNS' being the active tab. Below the tabs, there is a section titled 'IPv4 DDNS'. Inside this section, there is an 'Enable' checkbox which is currently unchecked. Below the checkbox, there is a 'Which Service' section with two radio buttons: 'ddns.nu' and 'dyndns.org', with 'dyndns.org' being selected. Below this, there is a section titled 'dyndns.org' which contains three input fields: 'Hostname' with the value 'ddns.wer', 'DDNS ID' with the value 'ddns.wer', and 'DDNS Password' with a masked password represented by eight dots.

Return to Network page to setup network further.

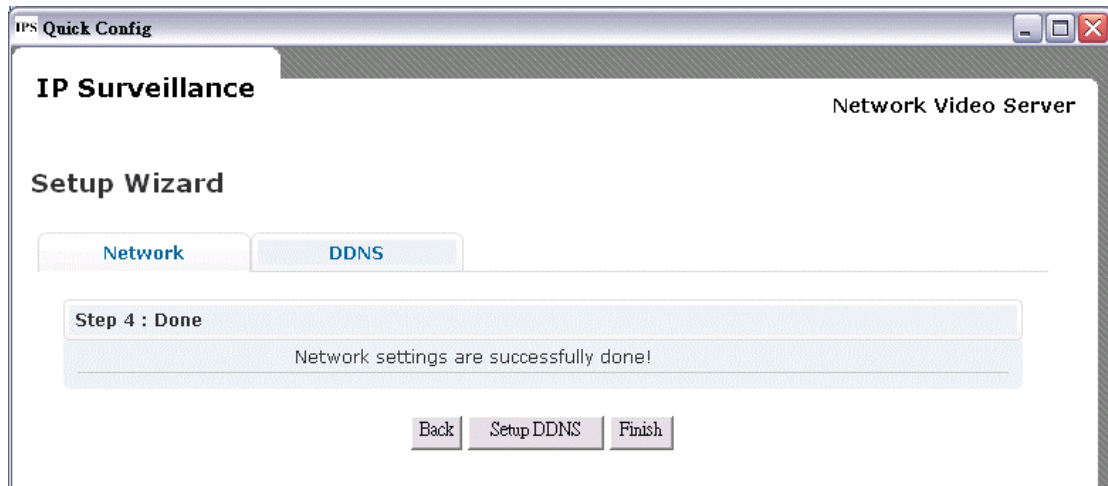
Please choose and click **next** for detailed configuration page.

For instance, shown below is a screen which has **STATIC** network configuration page. Click next to proceed.

The screenshot shows the 'IPS Quick Config' window. The title bar says 'IPS Quick Config'. Inside the window, there is a header section with 'IP Surveillance' on the left and 'Network Video Server' on the right. Below the header, there is a 'Setup Wizard' section. At the top of the wizard, there are two tabs: 'Network' and 'DDNS', with 'Network' being the active tab. Below the tabs, there is a section titled 'Step 3 : DHCP Notice'. Inside this section, there is a text box that says 'Please make sure that you are installing this machine at a network with DHCP Service. Otherwise, it cannot get a proper IP address.' At the bottom of the wizard, there are two buttons: 'Back' and 'Next'.

Clicking next will show that settings are saved. You can click finish if you are done or go back or change other settings.

Similarly you can change other settings at ease.



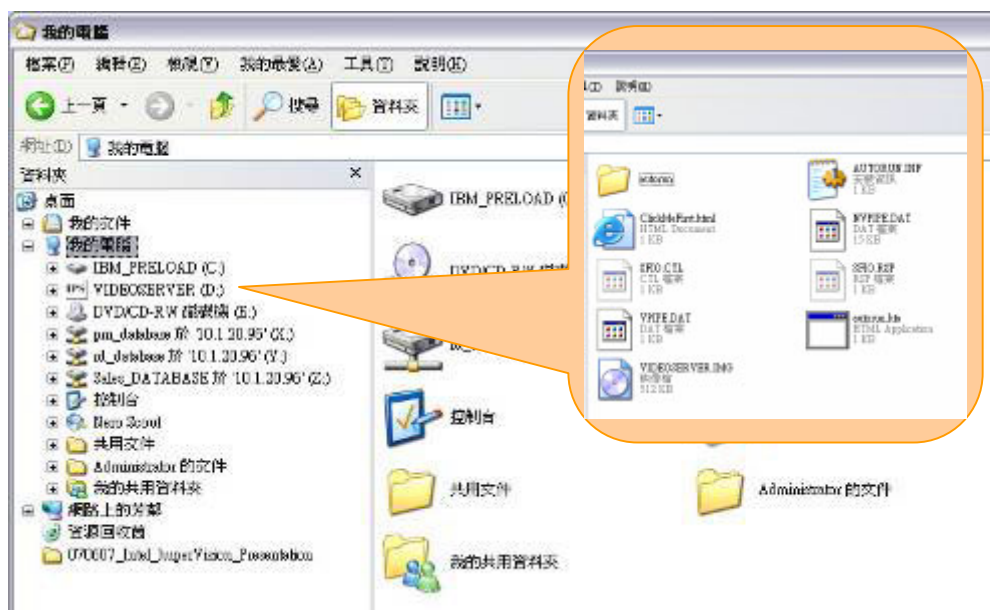
Note:

- Connect video servers to your network by using a standard Cat-5 cable.
- Connect the video output of your camera with video in of video server, using standard 75Ω coaxial cable with BNC type connector.
- Connect speaker and active microphone to Audio Out/In.

WHAT IF **QUICKCONFIG** DOES NOT AUTORUN?

In some PC, after connecting USB cable with Config port, there might not be auto run of Quick Config application.

In that case, just open disk drive which looks like shown on screenshot below. It should have volume name starting with VideoServer.





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